



Bexar Wire

San Antonio Radio Club
W5SC



2023, No. 11

November 2024

Robert A. Rodriguez Scholarship Raffle Drawing at November Meeting (Harold Fleischer AE5AS)



Robert A. Rodriguez, K5AUW displays a ticket

The San Antonio Radio Club is about to finish their fund raising raffle for the 2024 cycle. Raffle tickets can be purchased for \$25.00 each until just before the General Membership Meeting at 7 p. m. on Thursday, Nov 14, 2024 at Blanco BBQ. It is still possible to purchase them on-line by going to w5sc.org although for administrative reasons (like getting things ready for the drawing), **it will be difficult to get them after Wednesday, Nov 13, 2024, except at the "door".** See the club website for more information.



SARC Christmas Party Dec 5 Blanco Barbeque. There will be a raffle. (No Meeting December 12)

The next meeting, November 14, 2024, will be at 7 PM at Blanco BBQ, 13259 Blanco Rd, San Antonio, TX 78216, (210) 251-2602 . Program: Raffle

Field Day Results

**San Antonio RC AA5RO
307 2 41 2,682 STX**

Report decoded:

Name of club: San Antonio RC

Callsign used: AA5RO

Total QSOs: 307

Power: 2, (6 to 100 watts)

Participants: 41

Total Score with Bonus: 2,682

Section: STX (South Texas)

(SARC combined with AARO for Field Day)

Here is an excerpt from the ARRL story in December's QST:

Paul Bourque, N1SFE, ARRL Contest Program Manager

All 85 ARRL and Radio Amateurs of Canada (RAC) Sections participated in Field Day, and we received 64 entries from 27 countries outside the US and Canada, which is a record high for DX participation in this event. While the number of participants increased this year, the total number of entries decreased by 126 from 2023, which is a 3% change. Traditional Class A and B field stations represented 42.2% of all entries, while Class D and E home stations represented 52.4% of the total entries. Class C (mobile) stations remained relatively unchanged from last year. Class F (Emergency Operations Center, or EOC) slightly increased from 2023. The total number of reported QSOs increased by 4% to almost 1.3 million, likely attributed to increased propagation as we near the peak of Solar Cycle 25. The number of phone and CW contacts increased from last year, with more than 522,000 phone contacts and more than 490,000 CW contacts. More than 283,000 digital QSOs were reported this year, which is a slight decrease from last year.

(Continues on Page 5)



PRESIDENT'S RADIOGRAM

NUMBER	PRECEDENCE	HX	STATION OF ORIGIN	CHECK	PLACE OF ORIGIN	TIME FILED	DATE
11	R		N5IUT		San Antonio, TX		November 2024
TO							

Hello South Texas,

At the last meeting, I think everyone in the room could see the excitement when Steve Ortiz inquired about Fox Hunts. After the meeting, Steve coordinated two fox hunts for SARC. One at JOTA and the other last Saturday at McAllister Park.

Steve personally owns two foxes, plus a proper direction-finding antenna and a handy talkie radio. He also used the club's two foxes, four handy talkie radios and currently, three tape antennas. (I need to finish the fourth antenna!)

Both events were a great success! More fox hunts and other events will be posted on the calendar at Groups.io as we gather the data for the 2025 calendar.

Speaking of the calendar, on Thursday, December 5, 2024, at 7:00 PM, please attend the joint AARO, SADRC and SARC party at Blanco BBQ. Come on out, buy some tasty Blanco BBQ, see some old friends and make new ones.

This year, we will be having a raffle at the party.
I am Looking forward to seeing everyone there!

Paul Guido, N5IUT, President, San Antonio Radio Club

Bexar Wire

Published monthly by:



Paul Guido N5IUT
President, San Antonio Radio Club
Jimmie Neff, WJ4M
Editor
210-563-2121
jineffjr@sbcglobal.net

The due date for articles is the **Monday** before the first **Thursday** of the month

**San Antonio Radio Club
Meeting Minutes
7:00 p. m., October 10, 2024
Blanco BBQ, 13259 Blanco Rd., San Antonio, TX 78216**

Meeting called to order at 7:00XPM//Pledge of Allegiance//Introductions

**Presentation: Harold Fleischer, AE5AS — Analog vs. digital radio in VHF/UHF bands.
Lloyd Swartz – KF5ZHW – Great ShakeOut briefing. Annual international earthquake drill on
October 17, 2024. www.shakeout.org.**

Approval of Minutes of the Last Meeting

There being no additions or changes, the minutes were passed without objection by unanimous consent.

Officer Reports:

President – Paul Guido, N5IUT

- **Contacted by a reporter (TPR) re: emergency communications. Story was broadcast on Texas Public Radio.**
- **Planning for winter field day continues (January 2025).**

Vice President (Interim)– Lloyd Swartz – KF5ZHW – No report.

Secretary – Jack Bannin, N5JLB – The minutes from club meetings can be found at the w5sc.org website, in the Newsletters section.

Treasurer – Jon April, KI5CSK – No report.

Chairman of the Board Report – Harold Fleischer, AE5AS – Board did not meet this past month.

Education and Training – Marvin “Marlo” Brown (KJ5BQV) & Travis Buhler (KI5TXG):

Emergency Communications – Ned Lee KG5US – Bexar County RACES. Encouraged disaster preparedness.

Web Site – Bill Craft, KD2HIQ

Activities for September

- 1. Web Site-**
 - a. Posted newsletters**
- 2. Groups.io**
 - a. Updated membership list**
 - b. Updated calendar**

3. Mail chimp- Meeting notice
4. Twitter
5. Facebook -Meeting notice

MEMBERSHIP

As of 10/9/2024			
Paid: 159	New Members for 2024		
Mil: 6	First	Last	Call
Family Members: 18	Arthur	Yanez	
RF-Free: 10	Amanda	Underbrink	KJ5GVG
Fee-VE: 28	Allen	Gaughan	KJ5HJK
ARRL Members: 108			
Total Membership 221			

POTA – No report. <https://parksontheair.com/>. Special even on 10/19/24.

Fox Hunt – Next event: November 9, 2024 – Location to be determined.

Newsletter Editor – Jimmie Neff – Newsletter distributed October 9, 2024. Contact Jimmy if you want to contribute an article for publication. Deadline is the Monday before the monthly meeting.

Field Day – Jon April: Trailer boards will need to be replaced next year.

Finance and Review – No Report

JOTA – Position vacant. October 19, 2024 is the next JOTA event. If someone is interested in volunteering, must complete Youth Protection Training course first. John Douglas is still involved with the event, and we can coordinate with him. Begins at 9 AM. <https://www.scouting.org/international/jota-joti/jota/>.

Centennial Committee – Tom O’Brien AB5XZ – Swag for sale.

Radio Fiesta – Aubrey Mason –

VE Team – Benny Martinez, NU5P – Next test: October 26 @ Leon Valley Public Library, 6425 Evers RD, Leon Valley, TX 78238. Register at hamtest@w5sc.org.

Silent Key Committee – Rodney Brown, AA5RB – No activity.

Executive – No report.

Election Committee – Paul Guido, N5IUT – November elections upcoming. If interested, contact president. More information will be released via GroupsIO.

Scholarship Committee – Fundraiser for two scholarships continues. The winning tickets will be drawn at the monthly club meeting on 11/14/24.

Old Business (Motions carried over from previous meetings) – None.

New Business – None

Announcements –

- Cell phones can do satellite emergency texts.
- ARRL has partnered with Grouper for a discount for members. US-based members, age 65+ with a Medicare Advantage or Medicare Supplement plan, may be eligible for a benefit to offset annual ARRL dues and subscriptions. Visit arrrl.org and select the Membership tab for more information.

Meeting Adjourned @ 8:37 PM

ARRL Field Day Article (Ctd)

This year, ARRL announced that a new Field Day Responsibilities bonus of 50 points would be available for Class B, C, D, E, and F stations. Similar to the Safety Officer bonus available for Class A stations, this bonus encouraged participants to welcome guests to their Field Day locations and ensure that safety precautions were taken. Three hundred fifty-four participants claimed the Field Day Responsibilities bonus as part of their entries. How Do You Field Day? Field Day is whatever you make it. For some participants, it's a contest; for others, it's a social gathering and club activity. Other groups use Field Day to showcase

what amateur radio is all about to the public. Some groups use Field Day as an opportunity to introduce youths to amateur radio. The Coventry Emergency Management Agency, KC1CUE, held a radio merit badge class that had more than 20 participants from local scout troops in attendance. Other groups used the event as an educational experience.

Note: You can read the whole article in the December, 2024 QST, starting page 60.

Note: Radio Direction and Ranging (RADAR) was a major reason The RAF won the Battle of Britain, here is a description of what it took to operate the early radar (Ed)

At The Controls ·

Sean Brady · ·

Original description from RAF Museum page: "Chain Home: WAAF radar operator Denise Miley plotting aircraft on the CRT (cathode ray tube) of an RF7 Receiver in the Receiver Room at Bawdsey CH. Her right hand has selected the direction or height finding and her left hand is ready to register the goniometer setting to the calculator."
1945



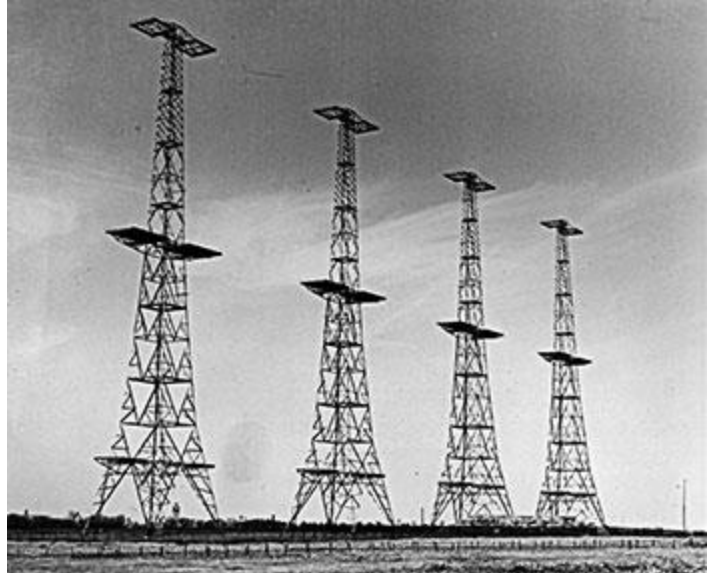
RAF Bawdsey was originally an experimental system set up at Bawdsey Manor, home of Robert Watson-Watt's radar development team. When the team was moved away from Bawdsey, the radar station became a part of the operational Chain Home (CH) network.

The main display is a large CRT, partially masked off by a metal box so only the lower half of the CRT remains visible. In earlier versions a scale running across the top of the opening allowed the range to the target to be measured. In this later version, a knob is used to move a cursor line across the screen to lie over a selected return. The cursor is driven by the same timing electronics as the rest of the radar, ensuring it is properly calibrated at all times.

The large knob on the left of the image is the goniometer control. Unlike later systems, CH used separate transmitters and receivers. The transmitter broadcast a semi-directional signal in front of the station, known as the "line of shoot", filling space with the signal. The receiver was a radio direction finder that searched that space for echoes. The goniometer knob changed the directional sensitivity of the receivers, allowing the angle to the target to be determined. This was a trial-and-error process of hunting for the maximum (or minimum) return in a noisy signal. Like most RDF systems, the antennas were equally sensitive in two directions; the small push-button to the upper left of the knob, the "sense button", mutes down one of these directions to determine which one is correct. This button is not visible in the cropped but higher quality version of the image seen here, it can be selected below.

A series of switches near Miley's right hand are used to select among several antennas on the receiver masts. Selecting a pair of these allows the goniometer to determine vertical angles instead of horizontal azimuth. With some calculation effort, this could be used to determine

altitude. Additional crewmembers known as "plotters", normally located behind the operator, were sent a stream of angle and range information and had to calculate the map location of the targets being measured. These were then reported up the Dowding system's telephone network to Fighter Command headquarters in London. Due to the noise caused by the different plotters calling out calculations to each other, the radar operator was connected to the main plotter via the intercom Miley wears around her neck.



This version, from later in the war, has been equipped with sensors to automate the plotting of the aircraft. One of these sensors can be seen attached to the goniometer control, the box-like object to the right of Miley's left hand. After measuring an angle with the goniometer and setting the cursor to measure the range of the selected "blip", the button under Miley's left hand was pressed to send these settings to a mechanical computer known as the "fruit machine". It carried out all of these calculations internally and then directly output the map location and altitude of the targets. This greatly reduced workload and allowed the stations to have smaller crews.

The metal box covering the CRT is also a later addition, a simple anti-jamming system. The Germans could jam the CH stations by broadcasting false echoes when they received a pulse from the CH station. These false signals were only partially synchronized, deliberately, so they jumped around the display and cluttered it up. The CRT was originally supplied with a fast-acting phosphor of a light blue color, but was later modified by placing a second layer of slower-acting, less-sensitive yellow phosphor on top. Signals that stayed in the same location long enough would cause the yellow layer to begin glowing in that location. When encountering jamming, the operator would pull the small metal tabs on the left side of the metal cover to move a yellow-coloured gel in front of the tube, filtering out the now noisy blue layer and leaving only the stable (but slower reacting) yellow signals visible. The marks on the metal cover suggest it has been used as an impromptu chalkboard.

In this example, the radar receiver system and display are co-located. In later setups, the display was removed from the receiver and placed beside the plotting boards. This provided a much more compact layout and allowed the plotters to see the display directly. Although it cannot be seen in this photo, the shaft from the goniometer runs out the bottom of the display cabinet and into the receiver chassis, and can be seen to be at a slightly different angle than the display itself. The later systems combined this into a single cabinet.



Volunteer Examiners at Work



From Bennie Martinez, NU5P VE Coordinator

No report for November

December Test to be annuounced

Register at HamTest@w5sc.org

Other info at W5SC.org click "Getting Started" then "Testing."



November Test Session Radio Winner:
Krista Zapata



SARC has had a Groups.io. Its name is saradioclub.

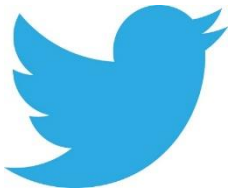
If you haven't signed up for group.io, you should. Groups.io is our primary email messaging method to all club members. It is FREE for all members.

Several members have asked where are the notices, schedules and codes for Zoom meetings?

1. The groups.io calendar has a schedule of Zoom meetings and access codes.
2. The calendar can be accessed directly from the club web site <https://w5sc.org/events-calendar/> NOTE: it is the same groups.io calendar.

The saradioclub Group.io is being used to publicize SARC business meetings. It can be used for other things like promotion of VEC testing and classes. Members of the saradioclub Group.io can and have asked each other technical questions or sought assistance.

The saradioclub Group.io is a closed group. To become a member, go to saradioclub.groups.io. (You may need to have a Groups.io account.) You will then need to select *Apply for membership in this group*. This generates a message. SARC members can expect approval to join the saradioclub Group.io in probably less than 24 hours.



Reminder: there are two active X (Twitter) accounts for the San Antonio Radio Club. They are @SARadioClub and @ARadioFiesta.

The @SARadioClub is being used to publicize SARC meetings. It can be used for other things like promotion of VEC testing and classes.

When work again commences the @ARadioFiesta will be used.

SARC members are encouraged to follow both Twitter accounts.

SARC Facebook



There is a San Antonio Radio Club – SARC (@saradioclub) Facebook Page.

The newsletter editor is making posts about SARC meetings and other activities. Any Officer, Committee Chairperson, or member who believes that they have information that should be posted to this page should contact the newsletter editor using the contact information for the newsletter editor on page 2 of this newsletter.

SARC members are encouraged to follow this Facebook Pa

SARC SLACK



There is a San Antonio Radio Club Slack team – w5sc.slack.com.

Slack teams are meant to foster communication between team members. Paul Guido, N5IUT, has established the w5sc.slack.com team for SARC. He has also established some channels. Think of the channels as topical areas.

To join send an email to Paul Guido, N5IUT, at radioteacher@gmail.com. In actuality, any team member already a part of the w5sc.slack.com can invite you, but Paul is known to be on it.

JOTA

Jamboree-on-the-Air, or JOTA, is the largest Scouting event in the world. It is held annually on the third full weekend in October.

JOTA uses amateur radio to link Scouts and hams around the world, around the nation, and in your own community. JOTA 2023 was held at McGimsey Scout Park Cub Pavilion 10810 Wedgewood Dr, Castle Hills, TX 78213.

. Anyone wanting to operate a station next year need to do the BSA Youth protection Training (YPT) and complete BSA Health forms.

<https://www.scouting.org/training/youth-protection/>

Amateur Radio License Classes

For more information, check the club web page, W5SC.org

SARC has a website:

w5sc.org

Webmaster: Bill Craft KD2HIQ
Billc851@gmail.com
210-570-0335

Emergency Communications

If you are interested in emergency communications, contact:

Ned Lee, KG5US
RACES Bexar County
210-344-3481/210-391-8258

David Rice, NB5K
ARES Bexar County EC 210-367-8623

Radio Fiesta 2024

Radio Fiesta 2025 was at Schertz Civic Center on July 19/20 and was a great success. Looking forward to Radio Fiesta 2025 next year.

License Testing Dates for 2024

SARC does all of its licensing testing as a part of ARRL Volunteer Examiner Coordinator (VEC) organization so all of the Volunteer Examiners in SARC are duly authorized Volunteer Examiners of ARRL's VEC.

Register at HamTest@w5sc.org

Other info at W5SC.org click "Getting Started" then "Testing."

Field Day 2024

Field Day exercise, June 27 – 28 at the City of Shavano Park city hall for the twenty first year. It was a great success. Start planning for FD 2025, *where SARC proves they are an eating group with a radio problem.*

SARC Meeting Dates for 2024

January 11, 2024
February 8, 2024
March 14, 2024
April 11, 2024
May 8, 2024
June 13, 2024
July 11, 2024
August 8, 2024
September 12, 2024
October 10, 2024
November 14, 2024
December – No meeting

Meetings are normally held at Blanco BBQ, 13259 Blanco Rd, San Antonio, TX 78216 at 7:00 p. m. Room is available at 6:00 p. m. for supper

Membership Dues Reminder

This year y'all made a new record for membership in 2024, 223 members.

But now we are going to start all over again for 2025

Now is the time to renew your membership; don't forget!

SARC can accept your credit card on-line for payment of dues.



Remember, the early discount only applies if you pay prior to January 13th 2025.

Pay online <https://w5sc.org/membership/>

Pay at the January meeting, cash, check or credit card.

You can go online and download the membership forms and mail in a check. [SARC-application-form-R2024-1.pdf](#)

It's a bargain at the discounted \$12 for a year. That's \$1 per month, what else can you buy for that price?

Thanks to the Board of Directors for containing club expenses to allow us to keep membership dues at the same level since 2008.

+++++

Get back on the road: If you've got an iPhone 14 or newer, you can get roadside assistance via satellite if you're out of cell range. From **Settings**, tap **Satellite**, and follow the instructions to get connected. Choose **Roadside Assistance**. Wham, bam.

Let's kick off things with a little tech know-how. Which of the following will totally destroy your Wi-Fi signal strength? Is it ... A.) LED lights, B.) Wooden furniture, C.) Mirrors or D.) Ceramic tiles? Come on, make your best guess. See if you're right by checking the answer at the end!

**Because of
smartphones,
did you hear they
aren't making
12-inch rulers
any longer?**



The answer: C.) Mirrors. They can kill a Wi-Fi signal, and not because you're so incredibly good-looking. The thin coat of metal on its glass causes electromagnetic interference, so you don't want to place a router near one.

Hamclock on Windows

KF0IDT posted a video a while back showing that HamClock can be loaded on a Windows system. Since then, a lot of people have commented that they have had problems getting it to load right. So, he has made a video going through the steps in real-time on how to load and configure Hamclock on both Windows 10 and 11, and it runs just fine. Hope you enjoy it!! <https://youtu.be/0lmcpbnUAoI>